CLAIMS

We claim:

1. A method of processing human blood samples comprising:

a. mixing a sample of human blood with an anticoagulant to form an anti-coagulated blood mixture;

b. centrifuging the anti-coagulated blood mixture in order to separate the plasma from the blood cells;

c. preparing a first blood cell mixture in accordance with the following steps:

1) preparing approximately two (2) volumes of Tris-buffer;

2) adding approximately one (1) volume of Tris-buffer saturated phenol, prepared by mixing re-distilled phenol with Tris-buffer, to the approximately two (2) volumes of Tris-buffer to produce a buffer diluted phenol; and

3) adding approximately four (4) volumes of the blood cells to the buffer diluted phenol;

d. centrifuging the first blood cell mixture to form a first liquid phase and first blood cell debris;

e. preparing a second blood cell mixture by mixing the centrifuged first blood cell mixture and first blood cell debris with approximately one (1) volume of chloroform

and approximately one (1) volume of Tris-buffer saturated phenol, prepared by mixing re-distilled phenol with Tris-buffer;

f. centrifuging the second blood cell mixture to form a second liquid phase and second blood cell debris;

g. cooling the second liquid phase and second blood cell debris long enough to allow the structural components of the DNA complex of the blood cells to aggregate;

h. placing an acid alcohol sample consisting of approximately twenty-five (25) volumes of freshly made 20% acid alcohol on a slide; and

i. adding a blood cell sample consisting of approximately one (1) volume of the cooled second liquid phase onto the center of the top surface of the acid alcohol sample and allowing both samples to dry at room temperature without any disturbance, whereby an aggregate of the DNA complex deposits a pattern on the slide which can be used to identify a change in the body of a human being caused by a physiological or pathological condition.

2. The method of claim 1 in which the Tris-buffer consists of 0.5 M Tris, 0.2 M EDTA, 0.6% NaCl, having a pH of between 10.3 and 10.4.

3. The method of claim 1 in which the step of centrifuging the first blood cell mixture is performed for approximately ten (10) minutes at approximately 11,000 rpm.

4. The method of claim 1 in which the step of centrifuging the second blood cell mixture is performed for approximately fifteen (15) minutes at approximately 11,000 rpm.

5. The method of claim 1 in which the step of cooling the second liquid phase is performed by placing the second liquid phase on ice for approximately fifteen (15) minutes.

6. A method of processing human blood samples comprising:

a. mixing a sample of human blood with an anticoagulant to form an anti-coagulated blood mixture;

b. centrifuging the anti-coagulated blood mixture in order to separate the plasma from the blood cells;

c. preparing a first blood cell mixture in accordance with the following steps:

1) preparing approximately 5 μl of Tris-buffer;

2) adding approximately 2.5 μl of Tris-buffer saturated phenol, prepared by mixing re-distilled phenol with Tris-buffer, to the approximately 5.0 μl of Tris-buffer to produce a buffer diluted phenol; and

3) adding approximately 10 μl of the blood cells to the buffer diluted phenol;

d. centrifuging the first blood cell mixture to form a first liquid phase and first blood cell debris;

e. preparing a second blood cell mixture by mixing the centrifuged first blood cell mixture and first blood cell debris with approximately 2.5 μl of chloroform and approximately 2.5 μl of Tris-buffer saturated phenol, prepared by mixing re-distilled phenol with Tris-buffer;

f. centrifuging the second blood cell mixture to form a second liquid phase and second blood cell debris;

g. cooling the second liquid phase and second blood cell debris long enough to allow the structural components of the DNA complex of the blood cells to aggregate;

h. placing an acid alcohol sample consisting of approximately 25 μl of freshly made 20% acid alcohol on a slide; and

i. adding a blood cell sample consisting of approximately 1 μl of the cooled second liquid phase onto the center of the top surface of the acid alcohol sample and allowing both samples to dry at room temperature without any disturbance, whereby an aggregate of the DNA complex deposits a pattern on the slide which can be used to identify a change in the body of a human being caused by a physiological or pathological condition.

7. The method of claim 6 in which the Tris-buffer consists of 0.5 M Tris, 0.2 M EDTA, 0.6% NaCl, having a pH of between 10.3 and 10.4.

8. The method of claim 6 in which the step of centrifuging the first blood cell mixture is performed for approximately ten (10) minutes at approximately 11,000 rpm.

9. The method of claim 6 in which the step of centrifuging the second blood cell mixture is performed for approximately fifteen (15) minutes at approximately 11,000 rpm.

10. The method of claim 6 in which the step of cooling the second liquid phase is performed by placing the second liquid phase on ice for approximately fifteen (15) minutes.